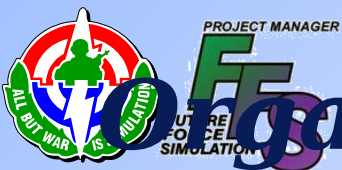


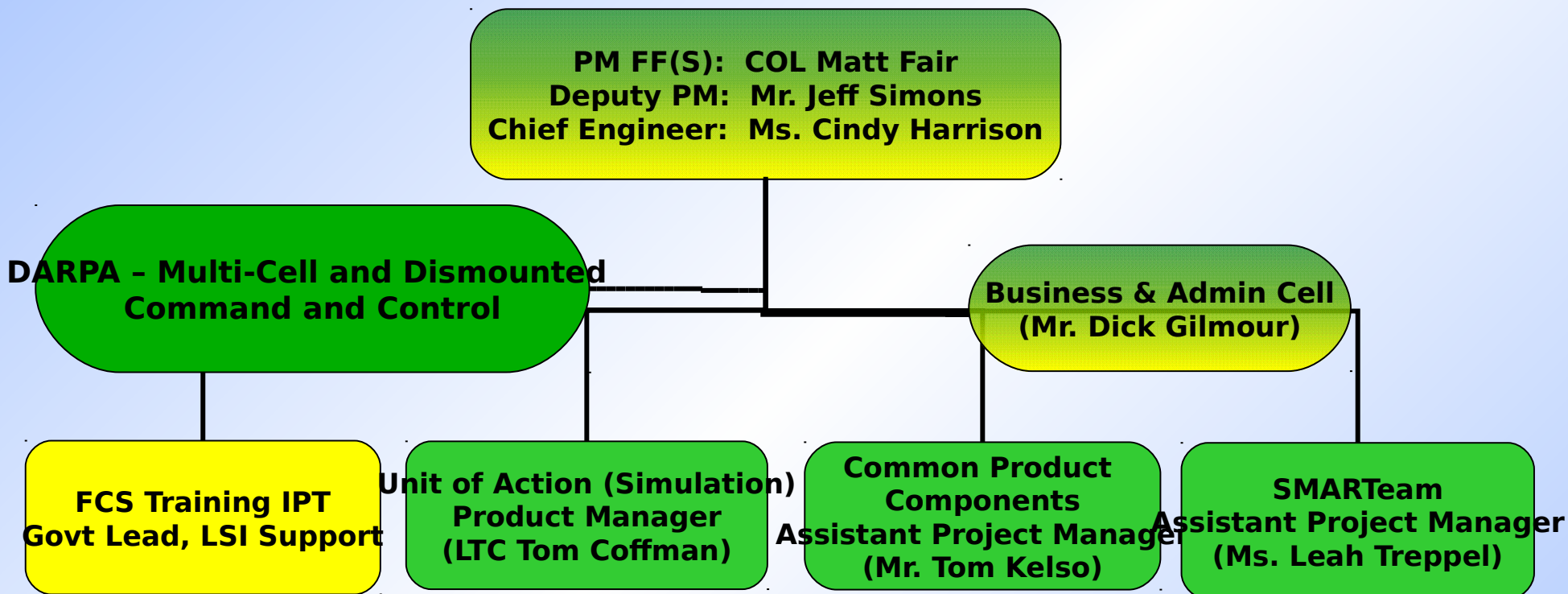
***COLONEL Matthew Fair  
Future Force (Simulation)***



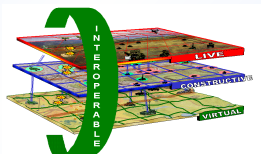
***Advance Planning Briefing to  
Industry  
9 - 10 Jun 04***



# Organizational Structure PM FF(S)



**FUTURE COMBAT SYSTEMS**  
**FCS**  
One Team-The Army/Defense/Industry



***Integrating Agent for the PEO***  
Responsible to orchestrate Integrated and Interoperable Simulation Solutions



*Future Combat Systems – Training Co-Lead*

---

*COLONEL Matthew Fair  
Program Manager*

- Responsible to PM UA as the Training IPT Co-lead
- First ever attempt to build, from the start, an Embedded Training capability organic to the platforms.

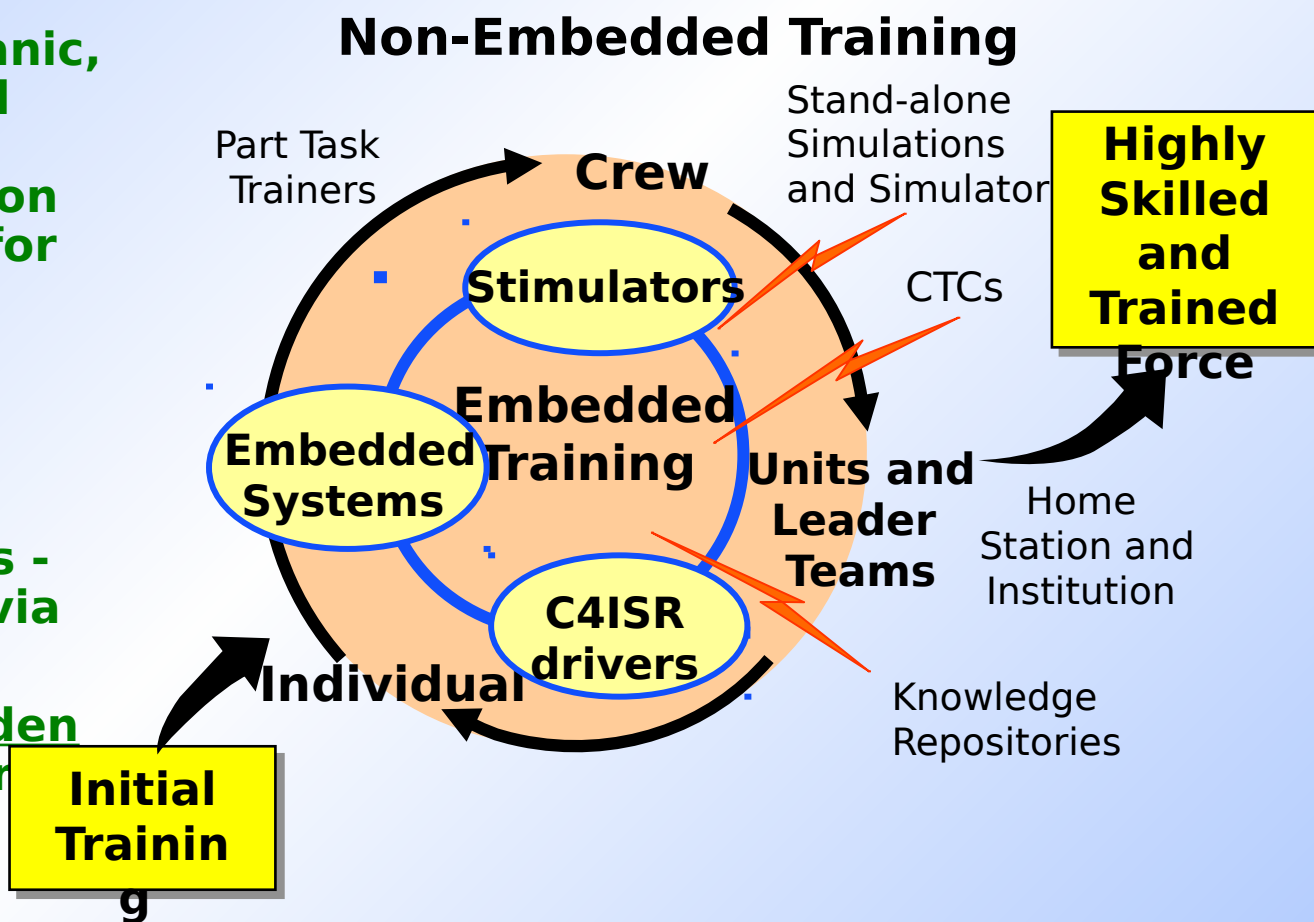
### **Key Performance Parameter # 6**

**“The FCS FoS must have an embedded individual and collective training capability that supports live, virtual and constructive training environments.”**

**Training as a KPP is unprecedented. As a KPP, system can not be fielded unless accomplished.**

# UA/FCS Training Concept

- **Expanded training availability using organic, integrated, embedded systems - Training, Operations, and Mission Planning/Rehearsal - for full spectrum training including JIM**
- **Full range of training task representation - individual, crew, collective, and leaders - embedded or 'reach' via C4ISR system**
- **Reduced training burden and cost resulting from product line design approach - maximum commonality between**



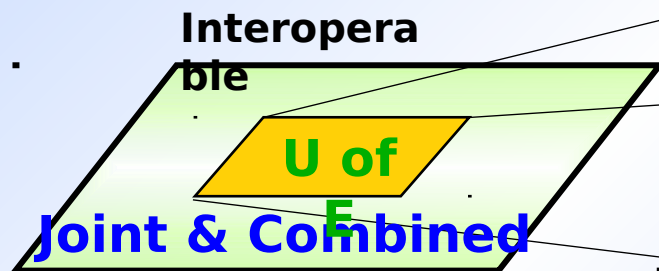
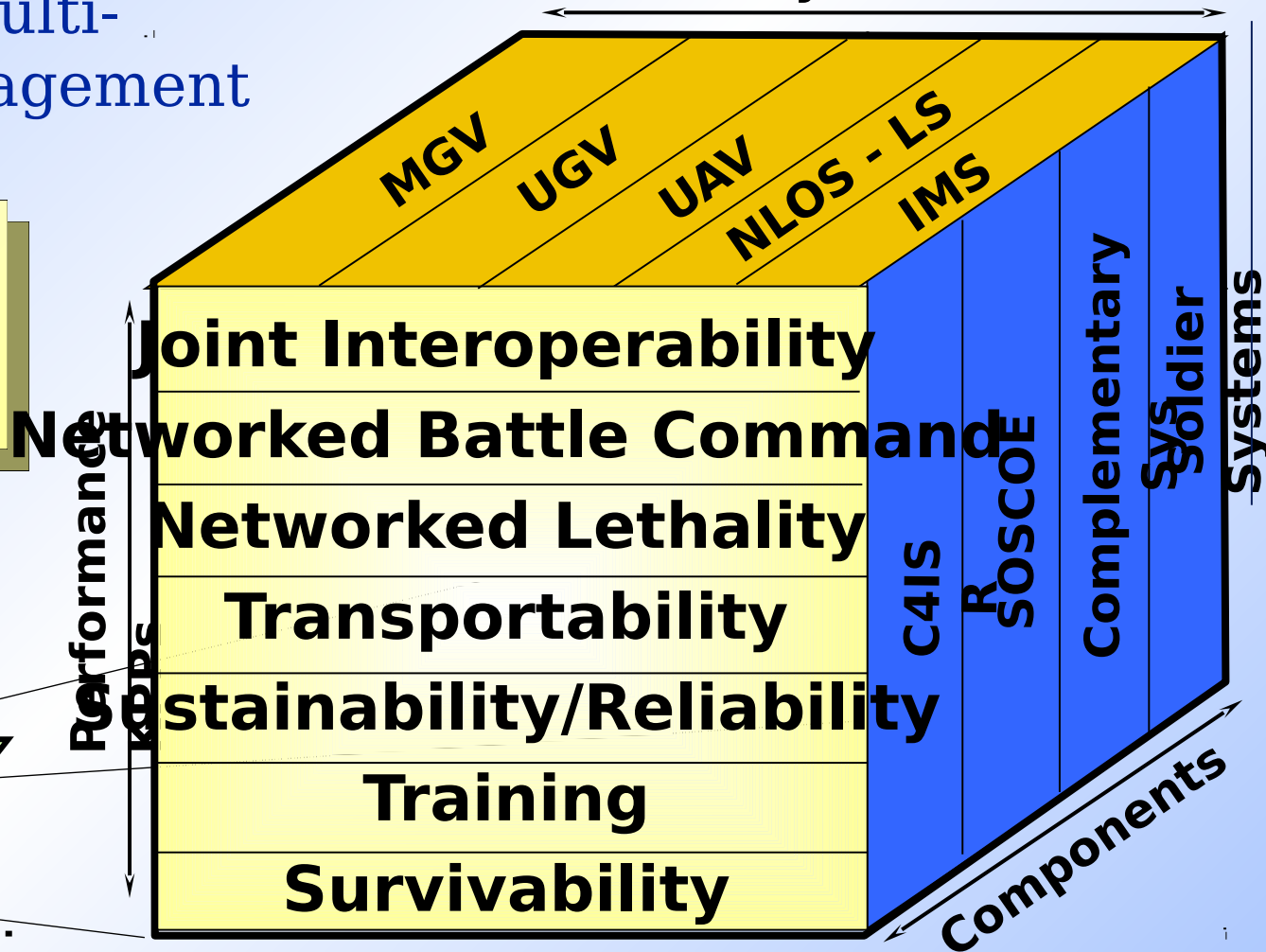
**FCS will provide the first Army Embedded Training capability**

**that supports Individual, Crew, Collective, Unit, and Leader Training**

# System of Systems Integration

Integration is a Multi-Dimensional Management Challenge

The Challenge is to Optimize all the Integration Parameters



An Integrated Design for System of System





# Training IPT Provides Products

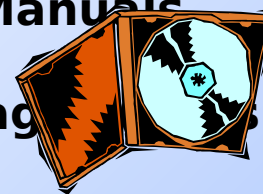
- **Mission and Task Analyses (TRADOC, FD, SEI, Suppliers)**
- **Embedded Training (ET) system (L, V, C)**
  - Driver Trainer
  - Weapons Trainer
  - RSTA Trainer
  - Battle Command Trainer

Each contains a progressive performance matrix (a la Conduct of Fire Trainer)
- **Stand-Alone Training Systems (reconfigurable) for those tasks which are unsafe, unaffordable or impractical for embedded training; expected primary support for institutions (L, V)**
  - High fidelity (ET) software
  - Desk-top

Each Stand-alone trainer reuses Embedded Training
- **Maintenance Trainers**
- **Training Support Packages (TSPs) - Individual and Collective**
  - Level V Interactive Electronic Technical Manuals (L = Live, V = Virtual, C = Constructive) based Training Support Packages (TSPs) Multimedia Instruction (IMI)



Common  
Embedded  
Training  
Software





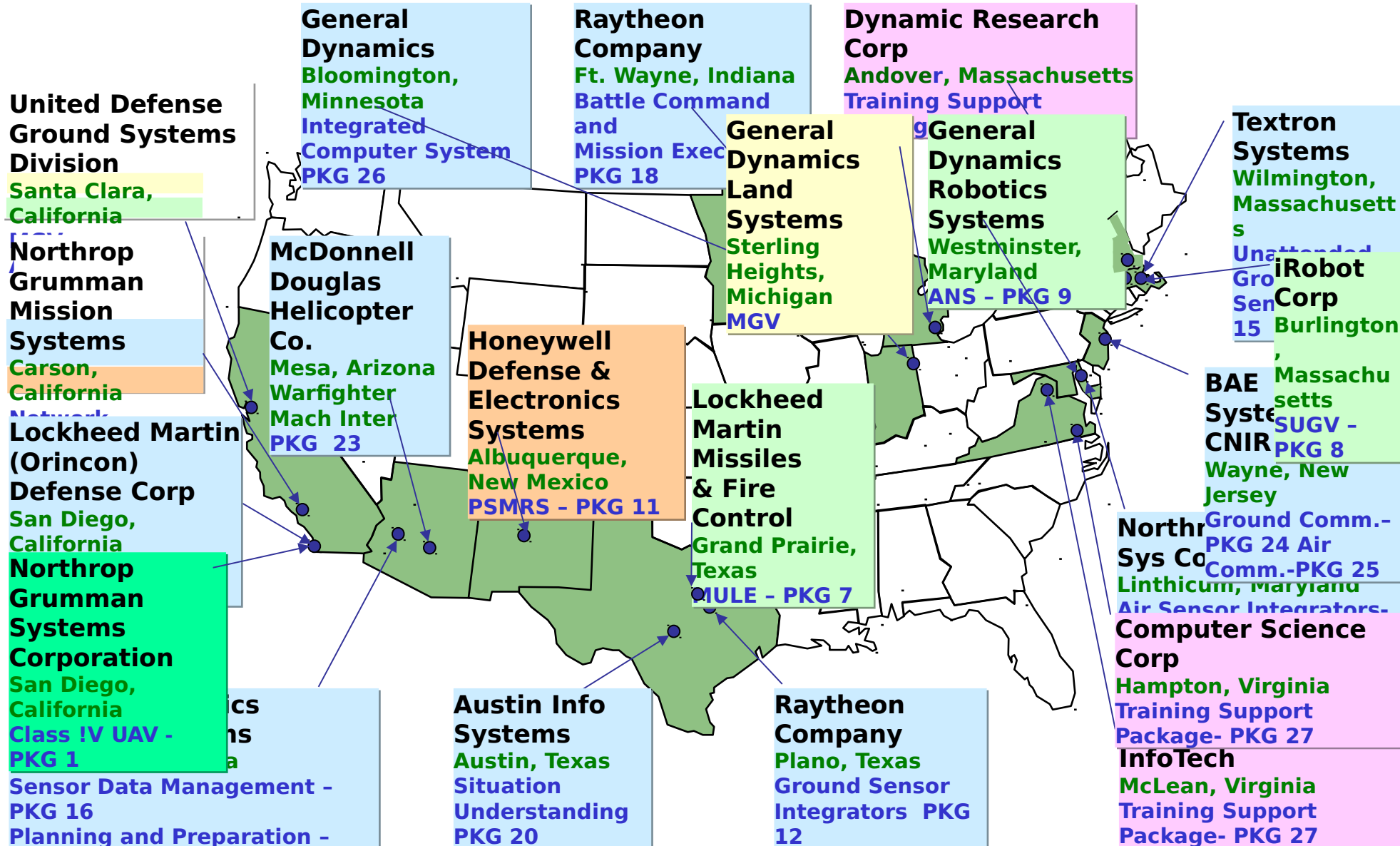
# ***Combat System Training Capability***

**The Future Combat System is the Army's next generation network-centric System of Systems (SoS) fighting capability. The FCS equipped Unit of Action will be trained through an embedded capability organic to the SoS covering individual, crew and collective tasks.**

**The Lead Systems Integrator (Boeing/SAIC) has been selected to acquire the FCS and embedded solutions. PM FF(S) is the co-lead to the Training IPT. There are no additional competitive procurements anticipated associated with the Embedded Training capability of FCS during SDD. However, potential exists in FY09 for production of related TADSS's (maintenance trainers; desktop trainers; etc).**



# Team



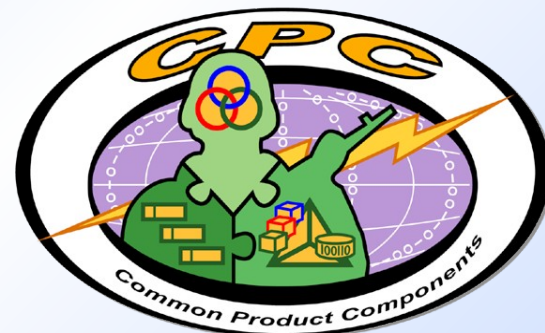


---

*Thomas Kelso*  
*Assistant Project Manager*

# Common Product Components

- Coordinates SW blocking activities for PEO
- Provider of common solutions
  - Repository for common software solutions
  - Works to achieve common solutions across PEO
- Develop Business Case across PEO for integrated common solutions
- Implementation of a Simulation Technical Support Facility (Analogous to CTSF)
  - PEO STRI -Integration Facilities Activities
  - Digital Integration Lab (Battle Command Integration)
- Provider of common component development toolsets
  - Requirements, Architectures, Collaboration, CM
- Maintains configuration control of CBU solutions
- Milestone Decision Authority (MDA) agent to evaluate MS decisions
- PEO STRI Lead for Army Training Information Architecture (ATIA)

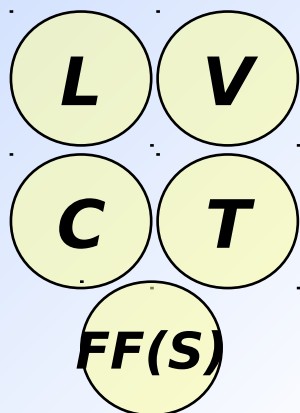
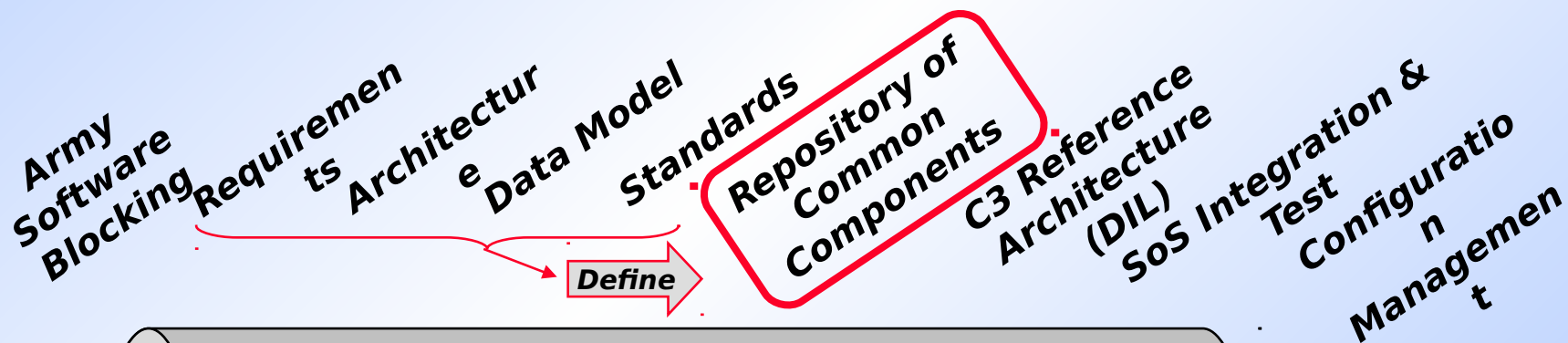


DIL ATIA

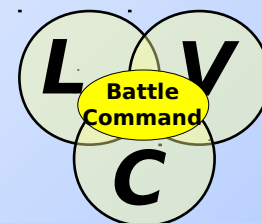
# PEO STRI Integration Services

## CPC Approach to Integration Services

-- Small, Highly Leveraged SME's Teams Plugged in to Army & Joint Processes to "Coach" our Programs in "Consistent" Implementation of "Best Practice" Integration Activities



Where We Are



Embedded  
OE ~ TE

Where We  
MUST Be

With CBU's to Develop Business Case for Common Component Development --



# ***Army Training Information Architecture***

- **Competition Type: TBD**
- **Contract vehicle: TBD**
- **Acquisition Strategy: Under Development**
- **Period of Performance: TBD**
- **Estimated Dollar Range: TBD**
- **Estimated RFP Release Date: TBD**
- **Estimated Award Date: TBD**
- **POC Information**
- **Name: Thomas Kelso**
- **Phone: 407-384-3863**
- **E-Mail: [thomas.kelso@peostri.army.mil](mailto:thomas.kelso@peostri.army.mil)**





# *Existing Contract Information*

## **C3 Driver**

- Lockheed Martin Simulation, Training & Support (LMSTS)
  - Contract N61339-00-D-0707
- Contact Information
  - Thomas Kelso (407) 384-3863
  - Barbara Ladd (407) 380-4099

## **SIMCI Support**

- COLSA Corporation
  - Contract N61339-00-D-0702
- Contact Information
  - Thomas Kelso (407) 384-3863
  - Barbara Ladd (407) 380-4099





# ***Existing Contract Information***

***(Continued)***

## ***CPC Office Support (SETA)***

- Morgan Research Corporation
  - Contract 4TWP21048000
- Contact Information
  - Thomas Kelso (407) 384-3863
  - Melissa Santarsiero 407-380-4199

## ***SIMCI Architect***

- AEgis Technology
  - Contract N61339-00-D-0703
- Contact Information
  - Thomas Kelso (407) 384-3863
  - Melissa Santarsiero 407-380-4199



# ***Existing Contract Information***

***(Continued 2)***

## ***SIMCI - Battle Management Language (BML)***

- Northrop Grumman Information Technology
  - Contract N61339-00-D-0708
- Contact Information
  - Thomas Kelso (407) 384-3863
  - Melissa Santarsiero 407-380-4199

## ***Strategic Planning & Model Driven Architecture***

- Data Access Technologies
  - Contract N61339-03-C-0164
- Mr. Lou Eyermann
  - Thomas Kelso (407) 384-3863
  - Melissa Santarsiero 407-380-4199



# *Existing Contract Information*

*(Continued 3)*

## *University XXI*

- University of Texas & Texas A&M University
  - Contract N61339-03-C-0111 & N61339-03-C-0123
- Contact Information
  - Ingrid Neal (407) 384-5330
  - Vanessa Dobson (407) 380-4348



*Simulation and Modeling for Acquisition, Requirements and Training  
(SMART)*

---

*Leah Treppel  
Assistant Project Manager  
Director*

*Becky Shell  
Project*

*Joe Mills  
Project Director*

*Kevin Nguyen  
Lead Engineer*

*Jovanna Nelson  
Project Coordinator*



# *Description*

**Provide expertise to Army Project/Program Managers on how to exploit Modeling and Simulation to enhance their current business practices, engineering toolsets and analytical capabilities in achieving Joint interoperable System of System solutions.**

**The SMARTeam gathers lessons learned from Programs that used M&S, maturing our collective expertise and subsequently sharing among other Army Program Leaders in preparing and executing their Simulation Support Plans.**



# *Contracting Opportunities Information*

- Only two contractual actions to date
  - Small Business Set Aside – under \$100k
  - Small Veteran Owned Business Set Aside – Under \$100k
- Both Sole Source to Vendors in community to support business development actions – no support in SMART services awarded.
- Currently no planned actions without additional Army Funding being provided to team directly or through other program actions.



***DARPA Program  
Multi-Cell and Dismounted Command and  
Control (M&DC2)***

---

*Maureen Molz  
Army Program Manager*



# *Description*

**Defense Advanced Research and Program Agency (DARPA) Multi-cell and Dismounted Command and Control (M&D C2) program under the PM - Gary Sauer located at DARPA in Arlington, VA. The Army Deputy PM is Maureen Molz. This program is a follow on R&D program from the FCS Command and Control (FCS C2) Program.**

**The program purpose is to spiral develop a multi-echelon, knowledge-based reasoning enhanced, C2 prototype model of a “net-centric” battle command system. Through experimental investigations that measure the effectiveness of its integrated battle command functions, inform the future force “Quality of Firsts” providing Commanders the decisive edge All information and findings are**



# *Recent Events*

**In November 2003, a decision was made to move the alpha development site for the M&D C2 program to PEO STRI because of its synergy not only with the M&S community, but also because of the training implications highlighted by its detailed analytic approach to battle command issues related to information centric operations resulting form a Network Centric Future Force.**

**M&D C2 will have a direct relationship with several PEO STRI programs including FCS, LVC-IA, OneSAF, ACTF and perhaps others.**

**The lab will be opened in July 2004 in Research Park.**



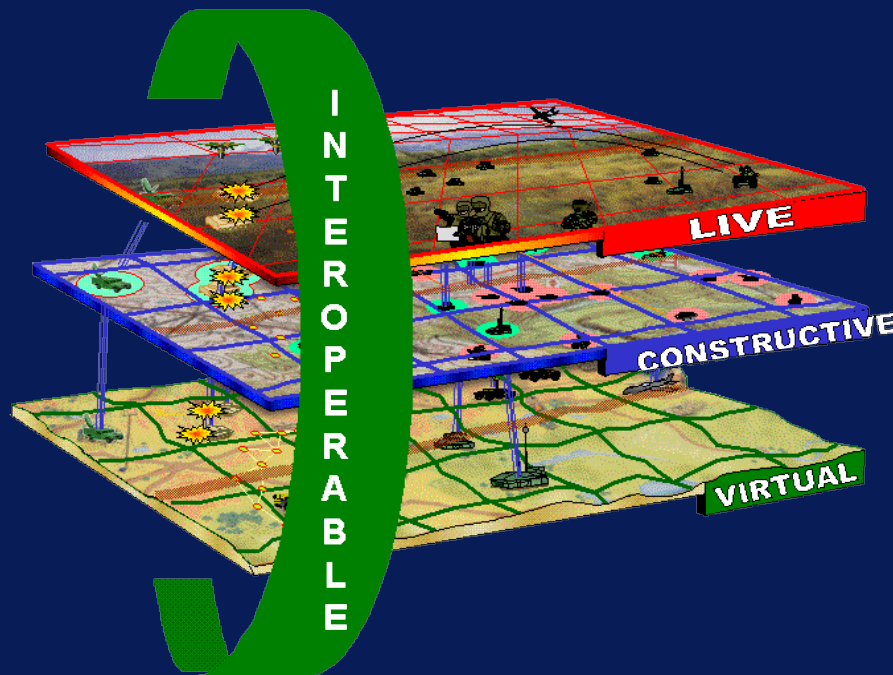
# ***Contracting Opportunities Information***

- **Competition Type: Full and Open**
- **Contract vehicle: DARPA BAA**
- **Acquisition Strategy: R&D/Various**
- **Period of Performance: FY04-FY06**
- **Estimated Dollar Range: Various**
- **Estimated RFP Release Date: NA**
- **Estimated Award Date: Initial BAAs awarded last June, however additional topics and awards can be made on this subject as described in the DARPA BAA Announcement ([www.darpa.mil/BAA](http://www.darpa.mil/BAA)) **Announcement # BAA03-33****
- **POC Information**
- **Name: Gary Sauer**
- **Phone: 703-696-7493**
- **E-Mail: [gsauer@darpa.mil](mailto:gsauer@darpa.mil)**

# Unit of Action - Simulation

## Army Constructive Training Federation

(ACTF)  
WARSIM  
OneSAF  
CBS  
JCATS  
DBST  
CSSTSS  
JDLM  
TACSIM



Embeds into and stimulates  
Army and Joint Battle Command Systems!

## Live Training Transformation (LT2)

CTC-OIS  
HITS  
NGATS  
CTIA  
DMPRC  
OneTESS

## Synthetic Environment

### Core (SE CORE)

CCTT  
AVCAT  
Soldier-CATT  
Common Driver  
Trainer  
Common Gunnery  
Trainer  
Other Virtual  
Simulators

---

LTC (P) Thomas Coffman  
Product Manager

# LVC-IA Program



- Create a Joint, Integrated LVC environment & capability that allows Army forces to routinely train/operate in the Contemporary Operating Environment (COE) / Joint Operating Environment (JOE) as part of a Joint Task Force (JTF).
- Develop a *“Joint Expeditionary Mindset”* which allows
  - Distributed Mission Rehearsals
  - Distributed Mission Planning
  - Full Spectrum Operations





# *Is the LVC-Integrated Architecture?*

- The LVC-IA is a set of protocols, specifications, and standards that permit interoperability and integration among Army & Joint LVC components.
- Provides an integrated LVC environment that ensures compatibility and interoperability for all TADSS and fully embeds into Future Force BCS, while linking to and stimulating Joint Command and Control (JC2) systems.
- Provides “Plug and Train” capability to support operations, mission planning-rehearsal, on demand, anytime, and anywhere, while training in a Joint context.
- Permits interoperability and integration among:
  - Joint Family of Simulations (JFOM)(JNTC Efforts)
  - Common Training Instrumentation Architecture (CTIA),
  - Synthetic Environment (SE) Core,
  - Army Constructive Training Federation (ACTF)
  - Test and Training Enabling Architecture (TENA), and
  - Other Potential LVC components (FCS FoS, WIN-T, BCS, ACSIS...)
- Embeds into and stimulates JC2.



# ***Contracting Opportunities Information***

- **Competition Type: STOC, Cost type contract (TBD)**
- **Contract vehicle : STOC**
- **Acquisition Strategy: 2 Phases**
  - **Pre-Acquisition Phase (FY 05-10)**
  - **System Design and Development (SDD) Phase (FY 06-11)**
- **Period of Performance: FY05 - FY10**
- **Estimated Dollar Range: 200+M**
- **Estimated RFP Release Date: TBD (1<sup>st</sup> QTR 05)**
- **Estimated Award Date: 2d Qtr 05**
- **POC Information**
- **Name: LTC Tom Coffman / Mark Jozwiak Phone: 407-384-5108/3729**
- **E-Mail: [Thomas.Coffman@peostri.army.mil](mailto:Thomas.Coffman@peostri.army.mil),  
[Mark.Jozwiak@peostri.army.mil](mailto:Mark.Jozwiak@peostri.army.mil)**



# *Acquisition Information* *(STOC)*

- Program Name, LVC-IA
- Contact information;
  - Ms. Melissa Santarsiero (407) 380-4199  
[Melissa.santarsiero@peostri.army.mil](mailto:Melissa.santarsiero@peostri.army.mil)
  - Ms Gloria Bailey (407) 380-8508  
[Gloria.bailey@peostri.army.mil](mailto:Gloria.bailey@peostri.army.mil)